

WHAT IS CLAIMED IS:

1. A commutator mounted on a rotor of an electric rotary machine, the commutator comprising:

2n commutator segments, n being an integer;

2n segment bases formed by separating a metallic base plate, each segment base contacting each commutator segment, wherein:

the 2n commutator segments are electrically insulated from one another;

the 2n commutator segments form n pairs of commutator segments, the commutator segments in each pair being positioned symmetrically with respect to an axis of the rotor; and

the commutator segments in each pair are electrically connected to each other through a connecting portion formed integrally with the metallic base plate.

2. The commutator as in claim 1, wherein:

the 2n segment bases are insulated from one another by slits formed on the metallic base plate.

3. The commutator as in claim 2, wherein:

n pieces of the connecting portions are formed integrally with the metallic base plate; and

the n pieces of the connecting portions are all depressed from a metallic base plate surface contacting the

commutator segments by a distance exceeding a thickness of the metallic base plate.

4. The commutator as in claim 3, wherein:

the $2n$ commutator segments form a commutating surface in a plane perpendicular to the rotor axis, so that brushes contact the commutating surface in a direction of the rotor axis.

5. The commutator as in claim 1, wherein:

the $2n$ commutator segments are made of carbon.

6. A method of manufacturing a commutator mounted on a rotor of an electric rotary machine, the commutator having commutator segments and segment bases for mounting the commutator segments thereon, the method comprising:

preparing a metallic base plate for forming the commutator bases, the metallic base plate having a plurality of slits for forming connecting portions each of which electrically connects a pair of the commutator segments located symmetrically with respect to an axis of the rotor;

depressing the connecting portions by an amount larger than a thickness of the base plate;

preparing a segment plate for forming the commutator segments;

mounting the segment plate on the metallic base plate so that both plates are mechanically and electrically connected to each other; and

forming separating slits through the connected metallic base plate and the segment plate to insulate the commutator segments from one another, the separating slits being formed so that the separating slits do not reach the depressed connecting portions.

7. The method of manufacturing a commutator as in claim 6, wherein:

the segment plate is made of carbon; and

the metallic base plate and the segment plate are connected by inserting projections formed on the segment plate into holes formed on the metallic base plate.